

Notice of Allowability

Application N .

09/747,703

Examin r

Michael Kornakov

Applicant(s)

NGUYEN, THOMAS D.

Art Unit

1746

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to 11/14/2003.
2. ☒ The allowed claim(s) is/are 1,4-6,9-18 and 21-39.
3. ☒ The drawings filed on 21 December 2000 are accepted by the Examiner.
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☐ All b) ☐ Some* c) ☐ None of the:
 1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).
- * Certified copies not received: _____.
5. ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
 - (a) ☐ The translation of the foreign language provisional application has been received.
6. ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application. **THIS THREE-MONTH PERIOD IS NOT EXTENDABLE**

7. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
8. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No. _____.
 - (b) ☐ including changes required by the proposed drawing correction filed _____, which has been approved by the Examiner.
 - (c) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No. _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the margin according to 37 CFR 1.121(d).

9. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- | | |
|--|---|
| 1 <input type="checkbox"/> Notice of References Cited (PTO-892) | 5 <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 2 <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 6 <input type="checkbox"/> Interview Summary (PTO-413), Paper No. _____. |
| 3 <input type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No. _____ | 7 <input type="checkbox"/> Examiner's Amendment/Comment |
| 4 <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit of Biological Material | 8 <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance |
| | 9 <input type="checkbox"/> Other |

REASONS FOR ALLOWANCE

Allowable Claims

1. Claims 1, 4-6, 9-18 and 21-39 are allowed over the prior art of record.

Reasons for Allowance

2. The following is an examiner's statement of reasons for allowance: The closest prior art of record are references to La and Guo, as applied in previous Office Actions on the merits. .

Applicant's amendments to claims 21-24 in Paper as of 11/14/2003 has overcome indefiniteness rejections under 35 USC 112, second paragraph, and these rejections are therefore withdrawn. Reasons for allowance of claims 5, 6, 9-18 have been discussed in the previous office action of 08/13/2003.

Applicant further amended claim 1 to reiterate that the only side of wafer, which is cleaned is a backside of the wafer. In examiner's opinion, this is not the major reason for allowance of claim 1. What makes a patentable difference between the disclosure of La and the instant claim 1 is that La teaches that between removing contaminants from the backside of the wafer and etching step, **the photolithography is performed**. The instant claims reiterate that between removal and etching steps, NO other processing steps are performed.

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Claim 5 recites the sequence of steps with transitional phrase "consisting of", thus excluding any other intervening steps, but those recited, in combination of cleaning only the backside of the wafer.

Claim 21 has been presently amended to emphasize that the specific etching task is the next processing step in a sequence, and that between the removing step and etching step there are no intervening processing steps, which is extremely important for preventing recontamination of the back side of the wafer.

Transitional phrases in claims 25 and 26 "consisting of" and consisting essentially of" exclude any other materially significant steps in the processing module, such as lithography that is performed in reference of La.

Although Guo reference remedies the deficiency of La, i.e. placing wafer on the chuck, it does not provide the motivation to perform tasks as recited in the instantly amended claims, specifically the absence of any intervening processing steps between the removing step and etching step.

No other prior art that anticipates or suggests fairly the instant claims has been, located as of the date of this office action. Therefore, claims 1, 4-6, 9-18 and 21-39 are allowed over the prior art of record.

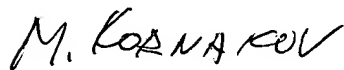
3. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michael Kornakov whose telephone number is (703) 305-0400. The examiner can normally be reached on 9:00am - 5:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Randy Gulakowski can be reached on (703) 308-4333. The fax phone number for the organization where this application or proceeding is assigned is (703) 872 9310.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308 2450.

A handwritten signature in black ink, appearing to read "M. Kornakov".

Michael Kornakov
Examiner
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December 14, 2003